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Medical ethics

# Crisis hits end-of-life care

The covid-19 pandemic has encouraged more people to make advance treatment decisions relating to CPR and ventilation, reports **Clare Wilson**

THE coronavirus outbreak is forcing people to confront dilemmas around how much medical care should be given at the end of life and rush controversial decisions about turning down certain treatments, palliative care experts say.

"The crisis has brought to the fore a lot of the problems with decision-making around the end of life which have been simmering for ages," says Celia Kitzinger at Cardiff University in the UK. "Coronavirus has lit the fuse."

These include concerns over whether some people receive excessive medical intervention such as CPR at the end of their lives, when it merely prolongs the dying process. Now, attention is also falling on whether everyone should get ventilation if their lungs fail, especially as there may not be enough machines to go around. Ventilation can be distressing and has little chance of success in the very old or those in poor health.

People need to think about whether they would want to go on a ventilator, or go to hospital at all, says Kitzinger. She says those in the UK should make an advance decision, a legally binding



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document about someone's medical choices, or give a relative lasting power of attorney to make decisions on their behalf, although it can take months to set one up. Kitzinger is a founder of Advance Decisions Assistance, a charity that helps people take these steps.

In the UK, many family doctors are now phoning or sending letters to patients who are older or who have underlying health conditions to discuss whether to opt out of interventions. "People are essentially being cold-called to make really difficult decisions," says Kathryn Mannix, a palliative care doctor in north-east England.

## Personal choices for end-of-life care are being rushed due to coronavirus

However, even if someone says they would want treatment, doctors can legally still decline if they think it would be futile.

The UK's National Institute for Health and Care Excellence (NICE) recently altered its new guidelines on who should get ventilation in response to claims these discriminated against people with autism or learning disabilities.

The original version, released on 21 March, said people shouldn't get ventilation if they are classed

as frail, as gauged by a medical rating scale designed for older people. This category covers people who have problems with dressing or bathing, for instance. But people with autism or learning disabilities may be cognitively unable to carry out such tasks, yet still be physically robust enough to benefit from ventilation.

A few days later, NICE changed its stance to say the guidelines don't apply to people with autism, younger people or those with learning disabilities. They were developed in "a very difficult period of intense pressure", a spokesperson told *New Scientist*.

In Australia, people are being urged to set down their preferences in so-called advanced directives and to tell their relatives and family doctor about them. In the US, doctors are encouraged to discuss end-of-life care, and about a quarter of people have made some kind of advance decision.

But covid-19 is making such conversations more common, says Shoshana Ungerleider, founder of End Well, a charity that promotes them. "I can't imagine that [covid-19] won't shift our perspective on this, at least for a short period of time." ■

## Managing symptoms

# Can breathing exercises help protect you from covid-19?

DEEP breaths and forced coughs could help clear mucus but are unlikely to help people with a dry cough and mild cases of covid-19, despite what advice on social media would have you believe.

Breathing exercises help manage some respiratory conditions, like chronic obstructive pulmonary

disease. The aims of the exercises are to clear lungs of sticky mucus, coordinate your breathing with medication to deliver the optimal dose and to keep the airways open, says Michael Niederman at Weill Cornell Medicine in New York.

The exercises often involve taking deep breaths and coughing

up sputum, and doctors may suggest devices to help with this.

On the face of it, simple breathing exercises, such as those recommended by a UK doctor in a viral video shared widely on Twitter, make sense for people with covid-19, says Niederman.

In the video, the doctor recommends taking a deep breath and holding it in before releasing it. The doctor suggests repeating this five times, before finishing a final round of breathing with a big cough.

The exercise is similar to others used in respiratory care, says Niederman. Deep breaths are generally a good idea, because they can encourage air into the depths of the lungs. If these pockets of the lung aren't used, they can essentially close, and become at risk of infection, says Niederman.

**"Taking deep breaths can be helpful, but it isn't a good idea to inhale through your mouth for them"**

## Why are ethnic minorities worse affected? Inequalities mean a disproportionate number of covid-19 patients are from minority ethnic backgrounds, reports **Loyal Liverpool**

DURING the coronavirus pandemic, people from black, Asian and minority ethnic (BAME) backgrounds are being hit particularly hard, according to emerging data.

The most recent figures compiled by the UK's Intensive Care National Audit and Research Centre suggests that of nearly 5000 people critically ill with covid-19 in England, Wales and Northern Ireland whose ethnicity was known, 34 per cent were from BAME backgrounds. But people from such groups make up only 14 per cent of the population of England and Wales, for instance.

In the US, figures released by the Centers for Disease Control and Prevention on 18 April showed that of about 120,000 confirmed covid-19 cases where race has been specified, 36 per cent were among non-white people, who account for 23 per cent of the US population. Most were in black or African-American people, who comprise 13 per cent of the population, but 30 per cent of all cases.

The UK government has launched an inquiry into this over-representation, and Public Health England is the first UK health body to say it will begin recording covid-19 cases and deaths by ethnicity.

The differences are due to

"widespread health inequities", says Linda Sprague Martinez at Boston University's school of social work in Massachusetts.

"Communities of colour are disproportionately impacted because of racism," she says. "It's not about people's biological make-up. It's about the conditions that are created due to racialised policies, and how that's impacted communities over time."

For example, poorer, more disadvantaged people – who are

disproportionately from ethnic minorities – are more likely to have underlying health problems such as heart disease, diabetes and obesity that put them at increased risk of covid-19, says Sprague Martinez. "When we have environmental conditions that leave communities vulnerable, that's when we see an increase in chronic disease," she says. "That's the result of policies that have left those communities marginalised."

In the US, where healthcare isn't universally accessible, studies have found that black people miss out on treatment because of racially biased algorithms. They are also less likely to have health insurance

and more likely to live in areas with fewer primary care doctors than their white counterparts.

BAME individuals may also be less able to do social distancing at home. "It's disproportionately certain groups

**34%**  
of adults critically ill with covid-19 in England, Wales and Northern Ireland are BAME

that still have to go to work," says Latifa Jackson at Howard University's college of medicine in Washington DC.

In the UK, 18 per cent of black people work in caring, leisure and other services that are either essential or jobs that can't easily be done from home. In the US, less than 20 per cent of black or African-American people can work from home.

These factors may be compounded by racial bias and discrimination in healthcare. Studies have found that people from BAME groups may be treated differently because of healthcare professionals' unconscious bias, says Jackson. This creates a system of advantage based on race, says Sprague Martinez. "We have to take that into account when thinking about why we're seeing differential impacts of covid-19." ■

### A pilot drive-through covid-19 testing site in Conyers, Georgia



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Deep breaths can also increase the amount of oxygen getting into the body, and the volume of carbon dioxide leaving it, says Ema Swingwood, chair of the Association of Chartered Physiotherapists in Respiratory Care.

Although taking deep breaths can be helpful, it isn't generally a good idea to inhale through your mouth for them, as the doctor in the video does. Sucking in a big gulp of air can irritate an existing dry cough.

Breathing in through your nose is a better idea, says Swingwood. "The nose warms and moistens the air that you take in," she says. "Breathing in dry air isn't going to help you."

A hard cough at the end of a breathing cycle would help clear out mucus, says Niederman. The problem is that most people who develop a cough with covid-19 have a dry cough, says Swingwood. For those people, big coughs are unlikely to be helpful.

Advice on social media also recommends lying on your front once you have completed breathing exercises. The idea is to take pressure off the lungs, which are located towards your back.

In a hospital setting, turning a person over is thought to allow oxygen to reach other parts of the lungs. But the decision to turn patients onto their fronts is made only after considering a range of factors, and doctors monitor how they respond to the new position.

Swingwood is concerned that people who are struggling to breathe could try to manage symptoms at home rather than seek help. "We want to make sure that people are reporting their symptoms and getting timely treatments," she says.

Breathing exercises won't stop people from getting covid-19, either. "I don't think we know completely, but it's unlikely to cause any extra benefit over going for a good old walk," says Swingwood. ■ Jessica Hamzelou